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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/659,265	09/11/2003	Yan-Ru Jiang	3313-1026P	3532
2292	7590	01/25/2007		
BIRCH STEWART KOLASCH & BIRCH PO BOX 747 FALLS CHURCH, VA 22040-0747			EXAMINER KASSA, YOSEF	
			ART UNIT	PAPER NUMBER
			2624	

SHORTENED STATUTORY PERIOD OF RESPONSE	NOTIFICATION DATE	DELIVERY MODE
3 MONTHS	01/25/2007	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Notice of this Office communication was sent electronically on the above-indicated "Notification Date" and has a shortened statutory period for reply of 3 MONTHS from 01/25/2007.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

mailroom@bskb.com

Office Action Summary

Application No.

10/659,265

Applicant(s)

JIANG ET AL.

Examiner

YOSEF KASSA

Art Unit

2624

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 11 September 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-10 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-6 and 10 is/are rejected.
- 7) ☒ Claim(s) 7-9 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 11 September 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-6 and 10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Gindele (U.S. Patent 6,636,646), and further in view of Dupont et al (U.S. Patent 7,020,346).

With regard to **claim 1**, Gindele discloses calculating a brightness difference between a selected pixel and one of neighboring pixels surrounding the selected pixel (please refer to col. 18, lines 7-18);

counting the number of abnormal pixels among the neighboring pixels (refer to col. 18, lines 19-25);

designating as particular pixels the selected pixels surrounded by the abnormal pixels, wherein the number of abnormal pixels is more than a predetermined value (refer col. 18, lines 32-47);

dividing an area surrounding each particular pixel into a plurality of blocks, and calculating a brightness difference between the blocks (refer col. 18, lines 60-67);

Gindele does not disclose expressly for finding out scratch pixels from the particular pixels based on brightness difference between blocks; and subdividing and filling up an area surrounded by scratch pixels. However, at the same field of endeavor, Dupont discloses this feature (please refer to col. 8, lines 5-34). At the time of the invention, it would have been obvious to a person of ordinary skill in the art to incorporate the teaching Dupont removal of scratches from digital image into Gindele system. The suggestion/motivation for doing so would have been to provide automatically eliminating scratches that have altered an original image (please refer to col. 2, lines 57-67 of Dupont). Therefore, it would have been obvious to combine Dupont with Gindele to obtain the invention as specified in claim 1.

With regard to **claim 2**, Gindele discloses wherein a neighboring pixel is an abnormal pixel when an absolute value of the brightness difference between the neighboring pixel and its corresponding selected pixel is greater than an abnormal standard (refer col. 18, lines 10-18).

With regard to **claim 3**, Gindele fail to disclose the particular pixels include scratch pixels and edge pixels. However, Dupont discloses this feature (please refer to col. 7, lines 19-29). At the time of the invention, it would have been obvious to a person of ordinary skill in the art to incorporate the teaching Dupont removal of scratches from digital image into Gindele system. The suggestion/motivation for doing so would have been to provide automatically eliminating scratches that have altered an original image (please refer to col. 2, lines 57-67 of Dupont).

With regard to **claim 4**, Gindele discloses wherein the area surrounding each particular pixel is divided into 4 blocks (refer col. 8, lines 45-55).

Claim 5 is similarly analyzed and rejected the same as claim 4.

With regard to **claim 6**, Gindele discloses wherein the area surrounding each particular pixel is divided into 8 blocks (refer col. 18, lines 44-48).

With regard to **claim 10**, Gindele fail to discloses the step of finding out scratch pixels from the particular pixels based on brightness difference between blocks, if the particular pixel has a Dif smaller than a difference standard, then the particular pixel is a scratch pixel, otherwise the particular pixel is a edge pixel. However, Dupont discloses this feature (please refer to col. 7, lines 19-37). At the time of the invention, it would have been obvious to a person of ordinary skill in the art to incorporate the teaching Dupont removal of scratches from digital image into Gindele system. The suggestion/motivation for doing so would have been to provide automatically eliminating scratches that have altered an original image (please refer to col. 2, lines 57-67 of Dupont).

Allowable Subject Matter

2. **Claims 7-9** are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Other Prior Art Cited

3. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

US Patent No. (6388704), (6304678), (6816197), (6539106) and (6633683).

Conclusion

4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to YOSEF KASSA whose telephone number is (571) 272-7452. The examiner can normally be reached on Monday-Thursday from 8:00 AM to 6:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bhavesh Mehta can be reached on (571) 272-7453. The fax phone numbers for the organization where this application or proceeding is assigned is (571) 273-8300 for regular communication and (571) 273-8300 for after Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the customer service office whose telephone number is (571) 272-2600.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only.

Art Unit: 2624

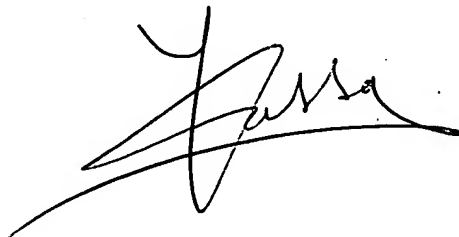
For more information about the PAIR system, see <http://pair-direct.uspto.gov>.

Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

PATENT EXAMINER

Yosef Kassa

01/19/2007.

A handwritten signature in black ink, appearing to read 'Yosef Kassa', with a long horizontal stroke extending to the right.